State of California AIR RESOURCES BOARD

Small Off-Road Engine Evaporative Emission System Components

Executive Order Q-12-018B
Xiamen Typesom Rubber & Plastic Industrial Co., Ltd.
Fuel Hoses

WHEREAS, Pursuant to California Health and Safety Code, sections 39600, 39601, and 43013, the California Air Resources Board (ARB) has established a certification process for evaporative emission system components designed to control gasoline emissions from small off-road engines, as described in California Code of Regulations, title 13, section 2767.1:

WHEREAS, Pursuant to California Health and Safety Code, section 43013, ARB has established criteria and test procedures for determining the compliance of evaporative emission system components with the design requirements in Cal. Code Regs., title 13, section 2754;

WHEREAS, Pursuant to Cal. Code Regs., title 13, section 2767.1, ARB Executive Officer may issue an executive order (EO) if he determines that small off-road engine evaporative emission system components conform to the applicable performance requirements set forth in Cal. Code Regs., title 13, section 2754; and

WHEREAS, Pursuant to California Health and Safety Code, sections 39515 and 39516, ARB Executive Officer issued EO G-05-008 delegating to the Chief of ARB Monitoring and Laboratory Division (MLD) the authority to certify small off-road engine evaporative system components.

NOW, THEREFORE, I, Michael T. Benjamin, Chief of MLD, find that Xiamen Typesom Rubber & Plastic Industrial Co., Ltd. TS-EP10 fuel hoses conform with the performance requirements set forth in Cal. Code Regs., title 13, section 2754, when tested at a constant temperature of 40°C, pursuant to SAE J1737, using an approved test fuel of CE10.

IT IS ORDERED AND RESOLVED that the Xiamen Typesom Rubber & Plastic Industrial Co., Ltd. TS-EP10 small off-road engine fuel hoses identified in Table 1 are certified for use in small off-road equipment.

Table 1
Dimensions and Tolerances for Xiamen Typesom Rubber & Plastic Industrial Co., Ltd.
TS-EP10 Fuel Hoses

Nominal Inside Diameters* and	Minimum EPA-TY-I15* Barrier Thickness
Tolerance (mm)	(mm)
2.4 or greater** ± 0.2	0.1 ± 0.02

IT IS FURTHER ORDERED that Xiamen Typesom Rubber & Plastic Industrial Co., Ltd. shall provide a warranty to equipment manufacturers purchasing the TS-EP10 fuel hoses. The warranty must conform to the requirements of Cal. Code Regs., title 13, section 2760.

IT IS FURTHER ORDERED that the certified Xiamen Typesom Rubber & Plastic Industrial Co., Ltd. TS-EP10 fuel hoses shall be installed in accordance with the manufacturer's installation and use instructions for Xiamen Typesom Rubber & Plastic Industrial Co., Ltd. TS-EP10 fuel hoses. A copy of this EO and fuel hoses' installation and use instructions shall be provided to manufacturers purchasing Xiamen Typesom Rubber & Plastic Industrial Co., Ltd. TS-EP10 fuel hoses for installation on small off-road engines and equipment introduced into commerce in California.

IT IS FURTHER ORDERED that Xiamen Typesom Rubber & Plastic Industrial Co., Ltd. TS-EP10 fuel hoses introduced into commerce in California shall be clearly identified by a permanent identification that allows ARB to identify the manufacturer's name, EO number, and model number.

IT IS FURTHER ORDERED that any alteration to the fuel hoses certified hereby is prohibited. Any alteration or modification of the design approved by this EO will require the manufacturer to apply for a new EO.

IT IS FURTHER ORDERED that the Xiamen Typesom Rubber & Plastic Industrial Co., Ltd. TS-EP10 fuel hoses shall be compatible with fuels in common use in California at the time of certification and any modifications to comply with future California fuel requirements shall be approved in writing by the Executive Officer or the Executive Officer's delegate.

IT IS FURTHER ORDERED that the component certification of the Xiamen Typesom Rubber & Plastic Industrial Co., Ltd. TS-EP10 fuel hoses can be referenced in certification applications for small off-road engines and equipment that use small off-road engines, unless the Executive Officer finds that the Xiamen Typesom Rubber & Plastic Industrial Co., Ltd. TS-EP10 fuel hoses no longer meet the performance requirements set forth in Cal. Code Regs., title 13, section 2754, when tested pursuant to Cal. Code Regs., title 13, section 2765.

Dr. Michael T. Benjamin, Chief Monitoring and Laboratory Division

*At the manufacturer's request EO Q-12-018A changed the barrier name in EO Q-12-018, Table 1, from EPA-TY-15 to EPA-TY-I15.

** At the manufacturer's request EO Q-12-018B amended EO Q-12-018A, Table 1, to include larger size hoses. Test data on file validated the change.